

INTENSITY MAP RESAMPLING FOR MULTI-LEAF COLLIMATOR COMPATIBILITY

ABSTRACT OF THE DISCLOSURE

A method for converting a source intensity map into a target intensity map having a geometry compatible with a desired multi-leaf collimator configuration. The source intensity map and the target intensity map each have a geometry defining sampling points of cells within the maps. The method includes defining a field on an object for radiation delivery. The field includes a plurality of cells defining the source intensity map, each of the cells having a treatment intensity level. An intermediate intensity map geometry is created such that the intermediate map contains sampling points of the source intensity map and the target intensity map. The method further includes defining treatment intensity levels for cells of the intermediate map and calculating treatment intensity levels for cells of the target intensity map based on the intensity level of the intermediate map cells.